

# DIALOG SEARCH.....

```
s (virtual(2w)router?)
      1855888      VIRTUAL
      555373      ROUTER?
S2      3832      S (VIRTUAL(2W)ROUTER?)
```

```
? s s1 and (pipelin? (4w)router?)
      6      S1
      2271731      PIPELIN?
      555373      ROUTER?
      1216      PIPELIN?(4W)ROUTER?
S3      0      S S1 AND (PIPELIN? (4W)ROUTER?)
```

```
? S S2 AND (PIPELIN? (4W)ROUT?)
Processing
Processing
      3832      S2
      2271731      PIPELIN?
      6191752      ROUT?
      18852      PIPELIN?(4W)ROUT?
S4      14      S S2 AND (PIPELIN? (4W)ROUT?)
```

```
? s s4 not py>2002
Processing
Processing
Processing
Processing
Processing
Processing
Processing
      14      S4
      88007358      PY>2002
S5      11      S S4 NOT PY>2002
```

```
? TYPE S5/3,K/ALL
```

5/3,K/1 (Item 1 from file: 16) [Links](#)

Gale Group PROMT(R)

(c) 2008 Gale/Cengage. All rights reserved.

06970027 Supplier Number: 58928060 (USE FORMAT 7 FOR FULLTEXT)

Lucent clarifies VPN offerings : Expands initiative with pair of acquired technologies, low-end hardware.(Ascend Communications/Xedia Corp)(Product Announcement)

Musich, Paula

PC Week , p 90

Jan 24 , 2000

Language: English Record Type: Fulltext

Article Type: Product Announcement

Document Type: Tabloid ; General Trade

Word Count: 467

-

The portfolio is built on existing Lucent products, particularly its

customer- premises equipment-based virtual private network routers, firewall-based VPN gateways, VPN clients and LSMS

(Lucent

Security Management Server) central security...

...provide site-to-site VPN services at T-1 speeds. It also integrates the

Ascend Pipeline and SuperPipe remote access routers.

Lucent expanded on that initiative with new releases of the Pipeline

and SuperPipe VPN software...

...0Integrates LSMS security software, Lucent's IPSec client and Xedia

Access Point routersIntegrates the Ascend Pipeline and SuperPipe remote access routersAdds security policy management to the

Pipeline

and SuperPipe product linesPipeline and SuperAdds support for standard...

5/3,K/2 (Item 1 from file: 47) [Links](#)

Gale Group Magazine DB(TM)

(c) 2008 Gale/Cengage. All rights reserved.

05512295 Supplier Number: 58928060 (USE FORMAT 7 OR 9 FOR FULL TEXT )

Lucent clarifies VPN offerings : Expands initiative with pair of acquired technologies, low-end hardware.(Ascend Communications/Xedia Corp)(Product Announcement)

Musich, Paula

PC Week , 90

Jan 24 , 2000

Document Type: Product Announcement

ISSN: 0740-1604

Language: English Record Type: Fulltext

Word Count: 491 Line Count: 00045

The portfolio is built on existing Lucent products, particularly its customer- premises equipment-based virtual private network routers, firewall-based VPN gateways, VPN clients and LSMS (Lucent Secur ity Management Server) central security...  
...provide site-to-site VPN services at T-1 speeds. It also integrates the Ascend Pipeline and SuperPipe remote access routers.

Lucent expanded on that initiative with new releases of the Pipeline and SuperPipe VPN software...

...0Integrates LSMS security software, Lucent's IPSec client and Xedia Access Point routersIntegrates the Ascend Pipeline and SuperPipe remote access routersAdds security policy management to the Pipeline and SuperPipe product linesPipeline and SuperAdds support for standard...

5/3,K/3 (Item 1 from file: 88) [Links](#)

Gale Group Business A.R.T.S.

(c) 2008 Gale/Cengage. All rights reserved.

06192506 Supplier Number: 89073222

A delay model for router microarchitectures.(includes related article titled "What Is Flow Control") (Special Issue: Hot Interconnects VIII Symposium)(Cover Story)

Peh, Li-Shiuan; Dally, William J.

IEEE Micro , 21 , 1 , 26(9)

Jan-Feb , 2001

Document Type: Cover Story

ISSN: 0272-1732

Language: English Record Type: Abstract

Abstract: A router delay model is described that takes the pipelined nature of router architecture into account. The model is used for comparing the performance of wormhole and virtual-circuit routers.

Abstract:

5/3,K/4 (Item 2 from file: 88) [Links](#)

Gale Group Business A.R.T.S.

(c) 2008 Gale/Cengage. All rights reserved.

05041675 Supplier Number: 53867883

Wormhole Routing Techniques for Directly Connected Multicomputer Systems.

MOHAPATRA, PRASANT

ACM Computing Surveys , 30 , 3 , 374(1)

Sept , 1998

ISSN: 0360-0300

Language: English Record Type: Fulltext; Abstract

Word Count: 19309 Line Count: 01549

...because of the multiple and simultaneous resource possession as well as

the chained blockings during pipelined routing. However, approximate analytical models based on simplifying assumptions can give

reasonable performance estimates.(1)

5...the opt-y algorithm is deadlock-free and optimal with respect to

the number of virtual channels per router and number of routing restrictions on the virtual channels. The optimally fully adaptive

routing algorithm...

5/3,K/5 (Item 1 from file: 148) [Links](#)

GALE GROUP TRADE & INDUSTRY DB

(c) 2008 GALE/CENGAGE. All rights reserved.

11692214 Supplier Number: 58928060 (USE FORMAT 7 OR 9 FOR FULL TEXT )

Lucent clarifies VPN offerings : Expands initiative with pair of acquired technologies, low-end hardware.(Ascend Communications/Xedia Corp)(Product Announcement)

Musich, Paula

PC Week , 90

Jan 24 , 2000

Document Type: Product Announcement

ISSN: 0740-1604

Language: English

Record Type: Fulltext

Word Count: 491 Line Count: 00045

The portfolio is built on existing Lucent products, particularly its customer- premises equipment-based virtual private network routers, firewall-based VPN gateways, VPN clients and LSMS (Lucent Secur ity Management Server) central security...

...provide site-to-site VPN services at T-1 speeds. It also integrates the Ascend Pipeline and SuperPipe remote access routers.

Lucent expanded on that initiative with new releases of the Pipeline and SuperPipe VPN software...

...0Integrates LSMS security software, Lucent's IPSec client and Xedia Access Point routersIntegrates the Ascend Pipeline and SuperPipe remote access routersAdds security policy management to the Pipeline and SuperPipe product linesPipeline and SuperAdds support for standard...

5/3,K/6 (Item 1 from file: 275) [Links](#)

Gale Group Computer DB(TM)

(c) 2008 Gale/Cengage. All rights reserved.

02365839 Supplier Number: 58928060 (Use Format 7 Or 9 For FULL TEXT )

Lucent clarifies VPN offerings : Expands initiative with pair of acquired technologies, low-end hardware.(Ascend Communications/Xedia Corp)(Product Announcement)

Musich, Paula

PC Week , 90

Jan 24 , 2000

Document Type: Product Announcement

ISSN: 0740-1604

Language: English Record Type: Fulltext

Word Count: 491 Line Count: 00045

The portfolio is built on existing Lucent products, particularly its

customer- premises equipment-based virtual private network routers, firewall-based VPN gateways, VPN clients and LSMS (Lucent

Security Management Server) central security...

...provide site-to-site VPN services at T-1 speeds. It also integrates the

Ascend Pipeline and SuperPipe remote access routers.

Lucent expanded on that initiative with new releases of the Pipeline and SuperPipe VPN software...

...0Integrates LSMS security software, Lucent's IPsec client and Xedia

Access Point routersIntegrates the Ascend Pipeline and SuperPipe remote access routersAdds security policy management to the Pipeline

and SuperPipe product linesPipeline and SuperAdds support for standard...

5/3K/7 (Item 1 from file: 348) [Links](#)

Fulltext available through: [Order File History](#)

EUROPEAN PATENTS

(c) 2008 European Patent Office. All rights reserved.

01057641

ROUTER TABLE LOOKUP MECHANISM

MECHANISMUS ZUM NACHSCHLAGEN EINER ROUTERTABELLE

MECANISME A CONSULTATION DE TABLE DE ROUTEUR

Patent Assignee:

- CRAY RESEARCH, INC.; (578485)  
655A Lone Oak Drive; Eagan, Minnesota 55121; (US)  
(Proprietor designated states: all)

Inventor:

- PASSINT, Randal, S.  
9550 167 Street; Chippewa Falls, WI 54729; (US)
- GALLES, Michael, B.  
1112 South Springer Road; Los Altos, CA 94024; (US)
- THORSON, Greg  
1119 Sweet Water Close; Altoona, WI 54720; (US)

Legal Representative:

- Beresford, Keith Denis Lewis et al (28274)  
2-5 Warwick Court High Holborn; London WC1R 5DH; (GB)

|             | Country | Number    | Kind | Date     |         |
|-------------|---------|-----------|------|----------|---------|
| Patent      | EP      | 1032887   | A1   | 20000906 | (Basic) |
|             | EP      | 1032887   | B1   | 20020306 |         |
|             | WO      | 9926163   |      | 19990527 |         |
| Application | EP      | 98959468  |      | 19981116 |         |
|             | WO      | 98US24468 |      | 19981116 |         |
| Priorities  | US      | 971587    |      | 19971117 |         |

Designated States:

AT; BE; CH; CY; DE; DK; ES; FI; FR; GB;  
GR; IE; IT; LI; LU; MC; NL; PT; SE;

International Patent Class (V7): G06F-015/173

NOTE: No A-document published by EPO

| Type | Pub. Date | Kind | Text |
|------|-----------|------|------|
|------|-----------|------|------|

Publication: English

Procedural: English

Application: English

| Available Text | Language | Update | Word Count |
|----------------|----------|--------|------------|
|----------------|----------|--------|------------|



|  |           |        |       |
|--|-----------|--------|-------|
| CLAIMS B                               | (English) | 200210 | 1166  |
| CLAIMS B                               | (German)  | 200210 | 1035  |
| CLAIMS B                               | (French)  | 200210 | 1356  |
| SPEC B                                 | (English) | 200210 | 10611 |
| Total Word Count (Document A) 0        |           |        |       |
| Total Word Count (Document B) 14168    |           |        |       |
| Total Word Count (All Documents) 14168 |           |        |       |

Specification: ...direction, and provide a new message direction via an exit port ID. Since routing is pipelined with link arbitration, the routing tables must include instructions as to how to traverse to the next router chip.

For...continuous. For example, after router chip 50 sends four micropackets across a physical link on virtual channel 0, router chip 50 can choose to send any number of packets on virtual channels 1-3...

5/3K/8 (Item 2 from file: 348) [Links](#)

Fulltext available through: [Order File History](#)

EUROPEAN PATENTS

(c) 2008 European Patent Office. All rights reserved.

01053793

VIRTUAL CHANNEL ASSIGNMENT IN LARGE TORUS SYSTEMS

ZUWEISUNG VON VIRTUELLEN KANALEN IN GROSSEN TORUSSYSTEMEN

AFFECTATION DE CANAUX VIRTUELS DANS DES SYSTEMES PRESENTANT DES  
TORES IMPORTANTES

Patent Assignee:

- CRAY RESEARCH, INC.; (578485)  
655A Lone Oak Drive; Eagan, Minnesota 55121; (US)  
(Proprietor designated states: all)

Inventor:

- PASSINT, Randal, S.  
9550 167 Street; Chippewa Falls, WI 54729; (US)
- THORSON, Gregory M.  
1119 Sweet Water Close; Altoona, WI 54720; (US)
- GALLES, Michael, B.  
1112 South Springer Road; Los Altos, CA 94024; (US)

Legal Representative:

- Beresford, Keith Denis Lewis et al (28273)  
BERESFORD & Co. 2-5 Warwick Court, High Holborn; London WC1R 5DH; (GB)

|             | Country | Number    | Kind | Date     |         |
|-------------|---------|-----------|------|----------|---------|
| Patent      | EP      | 1031096   | A1   | 20000830 | (Basic) |
|             | EP      | 1031096   | B1   | 20020724 |         |
|             | WO      | 9926162   |      | 19990527 |         |
| Application | EP      | 98957995  |      | 19981116 |         |
|             | WO      | 98US24422 |      | 19981116 |         |
| Priorities  | US      | 971591    |      | 19971117 |         |

Designated States:

DE; FR; GB;

International Patent Class (V7): G06F-015/173

NOTE: No A-document published by EPO

| Type | Pub. Date | Kind | Text |
|------|-----------|------|------|
|------|-----------|------|------|

Publication: English

Procedural: English

Application: English

| Available Text | Language | Update | Word Count |
|----------------|----------|--------|------------|
|----------------|----------|--------|------------|

|  |           |        |       |
|--|-----------|--------|-------|
| CLAIMS B                               | (English) | 200230 | 1224  |
| CLAIMS B                               | (German)  | 200230 | 1012  |
| CLAIMS B                               | (French)  | 200230 | 1545  |
| SPEC B                                 | (English) | 200230 | 10726 |
| Total Word Count (Document A) 0        |           |        |       |
| Total Word Count (Document B) 14507    |           |        |       |
| Total Word Count (All Documents) 14507 |           |        |       |

Specification: ...direction, and provide a new message direction via an exit port ID. Since routing is pipelined with link arbitration, the routing tables must include instructions as to how to traverse to the next router chip.

For...continuous. For example, after router chip 50 sends four micropackets across a physical link on virtual channel 0, router chip 50 can choose to send any number of packets on virtual channels 1-3...

5/3K/9 (Item 1 from file: 349) [Links](#)

Fulltext available through: [Order File History](#)

PCT FULLTEXT

(c) 2008 WIPO/Thomson. All rights reserved.

00495077

HYBRID HYPERCUBE/TORUS ARCHITECTURE  
ARCHITECTURE HYBRIDE HYPERCUBE/TORIQUE

Patent Applicant/Patent Assignee:

- CRAY RESEARCH INC

Inventor(s):

- PASSINT Randal S
- THORSON Greg
- GALLES Michael B

|             | Country | Number    | Kind | Date     |
|-------------|---------|-----------|------|----------|
| Patent      | WO      | 9926429   | A2   | 19990527 |
| Application | WO      | 98US24493 |      | 19981117 |
| Priorities  | US      | 97971588  |      | 19971117 |

Designated States: (Protection type is "Patent" unless otherwise stated - for applications prior to 2004)

JP, AT, BE, CH, CY, DE, DK, ES, FI, FR,  
GB, GR, IE, IT, LU, MC, NL, PT, SE

Publication Language: English

Filing Language:

Fulltext word count: 13693

Detailed Description:

...provide a new message direction via an I/O exit port ID. Since routing is pipelined with link arbitration, the routing tables must include instructions as to how to traverse to the next router chip.

For...continuous. For example, after router chip 50 sends four micropackets across a physical link on virtual channel 0, router chip 50 can choose to send any number of packets on virtual channels 1-3...

5/3K/10 (Item 2 from file: 349) [Links](#)

Fulltext available through: [Order File History](#)

PCT FULLTEXT

(c) 2008 WIPO/Thomson. All rights reserved.

00494811

ROUTER TABLE LOOKUP MECHANISM

MECANISME A CONSULTATION DE TABLE DE ROUTEUR

Patent Applicant/Patent Assignee:

- CRAY RESEARCH INC

Inventor(s):

- PASSINT Randal S
- GALLES Michael B
- THORSON Greg

|             | Country | Number    | Kind | Date     |
|-------------|---------|-----------|------|----------|
| Patent      | WO      | 9926163   | A1   | 19990527 |
| Application | WO      | 98US24468 |      | 19981116 |
| Priorities  | US      | 97971587  |      | 19971117 |

Designated States: (Protection type is "Patent" unless otherwise stated - for applications prior to 2004)

AT, BE, CH, CY, DE, DK, ES, FI, FR, GB,  
GR, IE, IT, LU, MC, NL, PT, SE

Publication Language: English

Filing Language:

Fulltext word count: 12179

Detailed Description:

...provide a new message direction via an 1 5 exit port ID. Since routing is pipelined with link arbitration, the routing tables must include instructions as to how to traverse to the next router chip.

For...continuous. For example, after router chip 50 sends four inicropackets across a physical link on virtual channel 0, router chip 50 can choose to send any number of packets on virtual channels 1-3...

5/3K/11 (Item 3 from file: 349) [Links](#)

Fulltext available through: [Order File History](#)

PCT FULLTEXT

(c) 2008 WIPO/Thomson. All rights reserved.

00494810

VIRTUAL CHANNEL ASSIGNMENT IN LARGE TORUS SYSTEMS

AFFECTATION DE CANAUX VIRTUELS DANS DES SYSTEMES PRESENTANT DES  
TORES IMPORTANTES

Patent Applicant/Patent Assignee:

- CRAY RESEARCH INC

Inventor(s):

- PASSINT Randal S
- THORSON Greg
- GALLES Michael B

|             | Country | Number    | Kind | Date     |
|-------------|---------|-----------|------|----------|
| Patent      | WO      | 9926162   | A1   | 19990527 |
| Application | WO      | 98US24422 |      | 19981116 |
| Priorities  | US      | 97971591  |      | 19971117 |

Designated States: (Protection type is "Patent" unless otherwise stated - for applications prior to 2004)

AT, BE, CH, CY, DE, DK, ES, FI, FR, GB,  
GR, IE, IT, LU, MC, NL, PT, SE

Publication Language: English

Filing Language:

Fulltext word count: 12558

Detailed Description:

...direction, and provide a new message direction via an exit port ID. Since routing is pipelined with link arbitration, the routing tables I 0 must include instructions as to how to traverse to the next router...continuous. For example, after router chip 50 sends four micropackets across a physical link on virtual channel 0, router chip 50 can choose to send any number of packets on virtual channels 1-3...

